



JOB DESCRIPTION

Position Title: **Engineer**

Working Area: **Public Works**

Class Code: 3601 Exempt

EEO Code: 02

Effective Date: August 30,

2002

Major Function

Technical work involving the engineering design of County roads, bridges, and drainage projects.

Essential Functions

Note: These are intended only as illustrations of the various types of work performed. The omission of specific duties does not exclude them from the position if the work is a logical assignment to the position.

Designs and prepares plans for complex County road, bridge, and drainage projects using computer aided drafting and/or manual methods. Interprets and plots survey notes.

Prepares preliminary and final quantity sheets and cost estimates. Prepares and revises maps, while printing and maintaining plan and map files. Reviews complex design plans from consultants for compliance with Seminole County Design Standards.

Assists Supervisor with training and instruction of technicians as necessary.

Performs other duties as assigned or as may be necessary.

Minimum Qualifications

Thorough knowledge of Engineering methods, techniques and procedures. Possess considerable knowledge of engineering design.

Considerable ability to prepare engineering construction plans. Ability to interpret survey notes and translate notes into drawings, plans, and plats of existing and proposed facilities. Ability to perform surveying trigonometric calculations and civil engineering calculations to determine loads, bearing values, stresses and strains. Ability to perform drainage calculations to evaluate and design appurtenant roadway drainage structures. Ability to use computer aided interactive design systems and application of computer aided drafting techniques.

Considerable skill in applying sound engineering principles to work, engineering drafting, and preparation of engineering plans. Skilled in the operation of normal engineering office equipment such as calculator, planimeter, print making machine, as well as computer aided design and drafting systems.

Bachelor's Degree in Engineering and four (4) year's experience in road design, including experience in designing Public Works facilities. Some experience in surveying is desirable. Prefer certification as an E.I.T. (Engineer in Training).

A comparable amount of education, training, or experience may be substituted for the minimum qualifications.

Working Conditions

The work environment for this position is primarily an office environment with some fieldwork. The incumbent performs most duties while sitting at a desk, table or workstation. Incumbents in this position are exposed to electrical and radiant energy found in an office environment.